



Air Quality Permitting Statement of Basis

November 23, 2003

**Tier II Operating Permit and Permit to Construct
No. T2-030045**

**Amcor Precast
Nampa, Idaho**

AIRS FACILITY NO.: 027-00085

Prepared by:

*Bill Rogers
Permit Program Coordinator
Division of Air Quality*

FINAL

1. PURPOSE

The purpose for this memorandum is to satisfy the requirements of IDAPA 58.01.01 Subparts 400 et seq. and 200 et seq., *Rules for the Control of Air Pollution in Idaho*.

2. PROJECT DESCRIPTION

Amcor Precast (Amcor) was issued Tier II operating permit and permit to construct no. T2-020011 May 29, 2003 for the construction and operation of a concrete precasting facility in Nampa. During the permit handoff, DEQ staff and Amcor staff discovered a few typographical errors in the final permit. DEQ recommended that Amcor submit an application to administratively revise or amend the permit to correct the typographical errors. Amcor submitted the amendment application June 27, 2003. DEQ determined the application complete September 11, 2003.

During processing of the amendment application, Amcor notified DEQ that a separate baghouse had recently been installed atop the fly ash storage silo to control particulate matter emissions when the fly ash silo was loaded. Amcor requested that DEQ include permit conditions for the fly ash silo baghouse into the permit as part of the administrative amendment to accurately reflect facility operations. The fly ash silo emissions were previously controlled by the same baghouse that controls emissions from the cement storage silo.

To facilitate Amcor's requests, DEQ crafted Tier II operating permit and permit to construct no. T2-030045. Corrections to the typographical errors were simply corrected and are not noted below; however, changes affecting the specific permit conditions are provided. To clearly identify what was deleted and what was added, the permit conditions are provided in the following format. Text that was deleted is struck through. Text that was added is underlined. Permit condition headings are unchanged as they appear underlined in both permits.

4.2 Control Description

Particulate matter emissions resulting from cement silo loading and fly ash silo loading are controlled by ~~a single~~ two separate baghouses. Fugitive dust from aggregate and sand transfer points, material transfer to the weigh hopper, and material transfer to the concrete mixing equipment is reasonably controlled by being confined in the mixing building.

4.3 Emissions Limits

Emissions of PM₁₀ from the cement storage silo baghouse vent and fly ash storage silos baghouse vent shall not exceed any corresponding emissions rate limits listed in Table 4.1.

Table 4.1. BAGHOUSE EMISSIONS LIMITS

Source Description	PM ₁₀	
	lb/d	T/yr
Cement <u>storage silo baghouse</u>	0.12	0.023
Fly ash <u>storage silo baghouse</u>	0.34	0.06

[IDAPA 58.01.01.211.01, 5/1/94] [PTC Condition]

4.4 Opacity Limit – Baghouse Stack Vents and Other Point Sources

Visible emissions from the each baghouse stack vent, ~~or any other stack, vent stack~~, or other functionally equivalent opening shall not exceed 20% opacity for a period or periods aggregating more than three minutes in any 60-minute period. Opacity shall be determined by the procedures contained in IDAPA 58.01.01.625.

4.5 Production Limits

4.5.1 The concrete production rate shall not exceed 1,392 yd³/day.

4.5.2 The concrete production rate shall not exceed 508,080 yd³ per any consecutive 12-month period.
[IDAPA 58.01.01.211.01, 5/1/94] [PTC Condition]

4.6 Weigh Hopper and Concrete Mixing Operations

The sand and aggregate transfer from the elevator bins to the weigh hopper above the concrete mixer shall be conducted in a building. The cement and fly ash transfer to the weigh hopper above the concrete mixer shall be conducted in a building.

[IDAPA 58.01.01.211.01, 5/1/94] [PTC Condition]

4.7 Cement Silo Loading and Fly Ash Silo Loading

Particulate matter emissions resulting from cement silo loading and fly ash silo loading shall be controlled by ~~a baghouse~~ the cement storage silo baghouse and the fly ash storage silo baghouse, respectively.

[IDAPA 58.01.01.211.01, 5/1/94] [PTC Condition]

4.8 Pressure Drop Measuring Device

The permittee shall install, calibrate, maintain, and operate, in accordance with manufacturer's specifications, equipment to continuously measure the pressure drop across the cement storage silo baghouse and fly ash storage silo loading baghouse.

[IDAPA 58.01.01.211.01, 5/1/94] [PTC Condition]

4.9 Baghouse Pressure Drop

The pressure drop across the cement storage silo baghouse and fly ash storage silo loading baghouse shall be maintained within the each baghouse manufacturer's and O&M manual recommended pressure drop operating ranges. Documentation of the ~~baghouse~~ manufacturer recommended pressure drop specifications shall remain onsite at all times and shall be made available to ~~Department~~ DEQ representatives upon request.

[IDAPA 58.01.01.211.01, 5/1/94] [PTC Condition]

4.10 Monitor Operating Parameters

The permittee shall monitor and record the following operating parameters. These records shall remain onsite for the most recent five year period and shall be made available to ~~Department~~ DEQ representatives upon request.

- The concrete production rate shall be monitored and recorded daily and annually to demonstrate compliance with Permit Condition 4.5.
- The pressure drop across the cement storage silo baghouse and fly ash storage silo loading baghouse shall be recorded once each time cement and fly ash are loaded into their silos to demonstrate compliance with Permit Conditions 4.7 and 4.9.

[IDAPA 58.01.01.211.01, 5/1/94] [PTC Condition]

4.11 Operations and Maintenance Manual Requirements

Within 60 days of issuance of this permit, the permittee shall have developed an O&M manual for the cement storage silo baghouse and fly ash storage silo loading baghouse. The O&M manual shall be developed using the each baghouse manufacturer's recommended operating specifications. The O&M manual shall contain at a minimum, the following information: the baghouse manufacturer's recommended pressure drop operating range for cement and fly ash PM₁₀ control; the manufacturers guaranteed PM₁₀ collection efficiency, or the manufacturers guaranteed grain loading; the airflow through the each baghouse, in acfm, induced by the fan; a general description of the each baghouse; the normal operation, maintenance, and repair of the each baghouse; and the methods of preventing malfunctions and the appropriate corrective actions to be taken in the event of a malfunction. The O&M manual shall be maintained onsite at all times, and shall be made available to Department DEQ representatives upon request.

[IDAPA 58.01.01.211.01, 5/1/94] [PTC Condition]

3. **RECOMMENDATIONS**

Based on the review of the application materials and all applicable state and federal regulations, staff recommends that DEQ issue administratively amended Tier II Operating Permit and Permit to Construct No.T2-030045 to Amcor Precast in Nampa.